Edik of "**Love and Math**" wrote that
my turkish was "*Google Translator -proof*".
I take this as a complement.. I will now re-write my previous message in english with some additions and include some new photos..
("Aşk ve Matematik" Kitabının yazarı Edward Frenkel Google a benim türkçemi tercüme ettirememiş.. Ben bunu bir kompliman olarak alacağım.. Şimdi bir önceki mesajımı bazı yeni eklemelerle ve yeni resimlerle ingilizce sunacağım..)

Subject: He is a Legend, He is a History... and we are so lucky that we are also included in this History:

As I see it now, also from the accompanying article (link at the end), there are two related but separate things:
Robert Langlands and Langlands Program.
At first I was surprised when I read the paragraph where **Jean-Pierre Serre** was mentioned.
Then I remembered a moment I had with late **Bertram Kostant**. Before telling you about that moment let me summarize my acquaintance with Bert: I saw him first time at **Berkeley** while he was on sabbatical (Spring 1973). I was already part of the **Symplectic** Geometry and Symplectic Lunches of **Alan Weinstein.** Kostant was lecturing on Lie Groups and Algebras from the Co-Adjoint Orbits viewpoint, simultaneously with **Kirillov** in Soviet Union and **Souriau** in France. **Moment Map** of Weinstein & Marsden was also out from Poland. In his "**Topology and Mechanics I & II** " papers **Smale** also had a hand in it as well. On a wednesday I was at the Lawrence Radiation Lab up on the Berkeley Hills for a talk on physics and afterwards I visited the small library next door where I came across a preprint by Kostant on **Geometric Quantization**. Made a copy of it and the next day at the Weekly Thursday **Chern**'s Seminars I showed it to Alan Weinstein. After he shuffled it a bit he simply asked: "*would you want to work on it?*" That was the beginning of my thesis with Alan.

Meanwhile Kostant was lecturing on Orbits in a small room at the bottom level of Evans Hall to at most 8 to 10 graduate students. I never saw him coming to class with any notes or preparation. He assigned interesting problems, and when he realized that I was interested in the subject he asked me to collect and evaluate the HW papers for his future use when it comes to grading, which he was not interested at all. One could see that his mind was very busy with orbit representations. Some of the problems he assigned were beyond me. Luckily there was a japanese student in class so I could use his answers to evaluate the rest, including mine... Jerold Marsden's g.f. Jane also attended Kostant's lectures for a few weeks during which it was obvious that Bert was as if he were lecturing to her especially...(she was something else those days, during youth every one is beautiful and Jane was extra gorgeous!). Those were the interesting times at Berkeley: 68 onwards, the first half of 70's, and I happened to be there. How lucky am I!   After a weekend visit Bert had made to Yosemite, I went to his office to show him an observation that I thought I had made. He looked at me, a typical Berkeley hippy, Bert was a "square man", he was not happy with my looks, (but o.c. I thought I was also gorgeous...)

Yilmaz Akyildiz
Diff. Geometry

In his mind Bert must have related the 70's Berkeley culture to being leftist, socialist and even communist and he started talking to me about his visit to Moscow and meting I.M. Gelfand. While he was complaining about the Soviet life, e.g. not being able to find a place to eat properly, terrible services at restaurants, etc etc.. complaints complaints, when it came to Gelfand I thought he was talking about the "God", whom I have also came across when I saw Gelfand in Lyon in 1984 at the Elie Cartan's Mathematical Heritage Meeting..., these pictures are some of my bests:
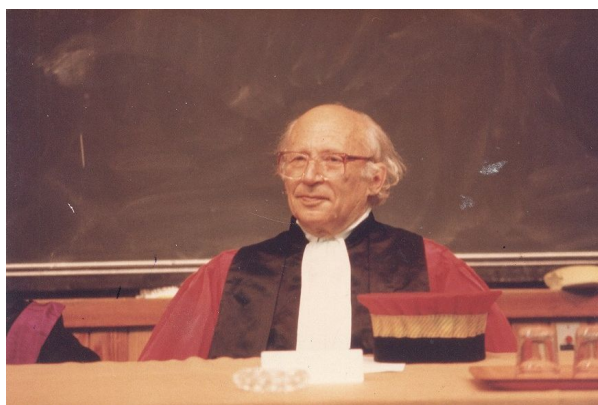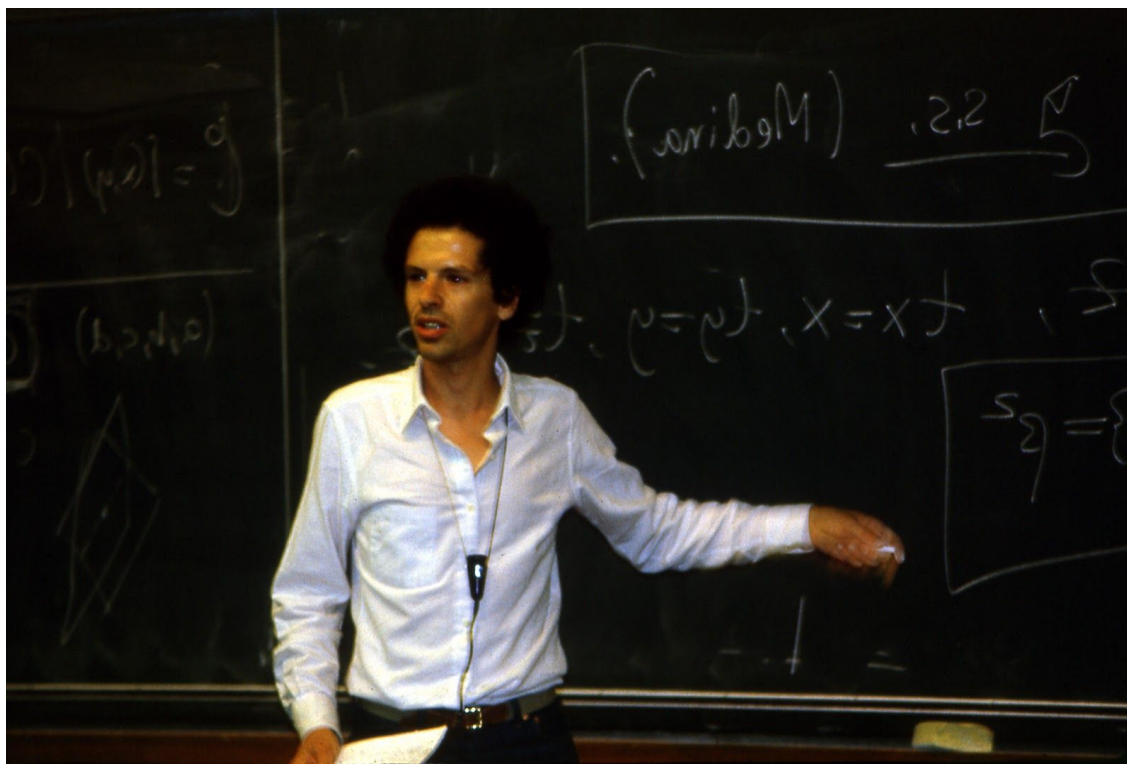

I M Gelfand at Lyon in 1984

far left: V. Guillemin, far right: B. Kostant

At the Elie Cartan Heritage Meeting **Alan Weinstein** lectured on his recent Journal of Diff. Geometry Paper: Poisson Manifolds

So much young looking, so slim and so sharp & determined..

Going back to Bert's Office, Kostant talked about how Gelfand's apartment flat - door was always open to everyone and with plenty of food... Who could guess then that, years later, Gelfand would leave Moscow and spend his late years in USA... In "Love & Math" Frenkel's memories of Gelfand at Moscow also makes very interesting reading. I wonder if they met in USA and would Ed write about it..?

From my accent Bert could not guess where I may be from, so he asked and immediately added: "*Asım Orhan Barut, one of your countryman, has a book (with Racka, a polish academician) on group representations where they make very interesting calculations on non-compact semisimple Lie Groups* ". At last I was able to tell Kostant about my observation on the co-adjoint orbits and nilpotent Lie groups. He immediately called **Joseph Wolf** and showed it to him. The next day

Wolf was out with the early announcement of his next paper, where the way he tells the story is not quite correct but it is ok...

REMARK ON NILPOTENT ORBITS

JOSEPH A. WOLF[1]

ABSTRACT. If G is a reductive Lie group and $\mathcal{O}_f = \mathrm{Ad}(G)^* f$ is a nilpotent coadjoint orbit with invariant real polarization $\mathfrak{p}$, then $\mathcal{O}_f$ is identified as an open G-orbit on the cotangent bundle of G/P.

Introduction. Let $R^{4,1}$ denote real 5-space with the bilinear form $b(x, y) = x^1 y^1 + \ldots + x^4 y^4 - x^5 y^5$ and let $\mathcal{C}^+$ denote its forward light cone $\{x \in R^{4,1} : b(x, x) = 0 \text{ and } x^5 > 0\}$. The rays in $\mathcal{C}^+$ form a 3-sphere S^3, and so the identity component $\mathrm{SO}(4, 1)$ of the orthogonal group of $R^{4,1}$ acts on the cotangent bundle $\mathcal{T}^*(S^3)$. This observation is due to B. Kostant, who noted that $\mathrm{SO}(4, 1)$ is transitive on the symplectic manifold $\mathcal{T}^*(S^3)$–(zero section) and asked Y. Akyildiz to identify that space as a coadjoint orbit for $\mathrm{SO}(4, 1)$. Akyildiz identified it as a nilpotent coadjoint orbit, and Kostant noted from dimension considerations that the nilpotent elements

Joseph Wolf is one of the most prolific mathematician I have seen, (last time in Lyon, 1984). He was famous for the thickness of the PhD theses written under his guidance.
*Pictures taken by **Selvi May Akyıldız** 40 years later in 2013..., how the years past:*

Kurt Yusuf (wolf joseph, we called him in turkish) was a very hard working man, once on the 10th Floor Coffee Room, I heard of him saying as if in a "*complaining*" manner "*there is just too much mathematics in this room…*" That time I must have thought "*if Kurt Yusuf thinks so… gods help us, the students..!* "

In later years, after 9/11, I met Kostant again at a Mathematical Physics Conference in Montreal, (where I saw Marsden the last time). Bert in the picture below was talking about a documentary on salmon fish he watched on TV the night before and explaining how amazed he was and how he could no longer eat fish any more…

He was with his new (publisher) wife and still in good health, so I invited him to Turkey. I told him Weinstein came, Robert Langlands visits us quite often, and now it is his turn.. He backed a bit and said

"*no way*" and mentioned the islamic terror. Well, that time Turkey was not this much islamized.. So I insisted and happened to tell him that among many other languages Langlands speaks turkish also.. Wow, he was quick to respond: "*is knowing turkish also part of Langlands Program?*" I shut up...

In later, years while visiting Istanbul and lecturing on Euclid in turkish, I shared this Kostant-Memoir of mine with Bob. As usual he was quiet and showed no emotions or response.. as if he never heard of any thing.. From this picture too, you can guess how humble (mütevazi) he is:
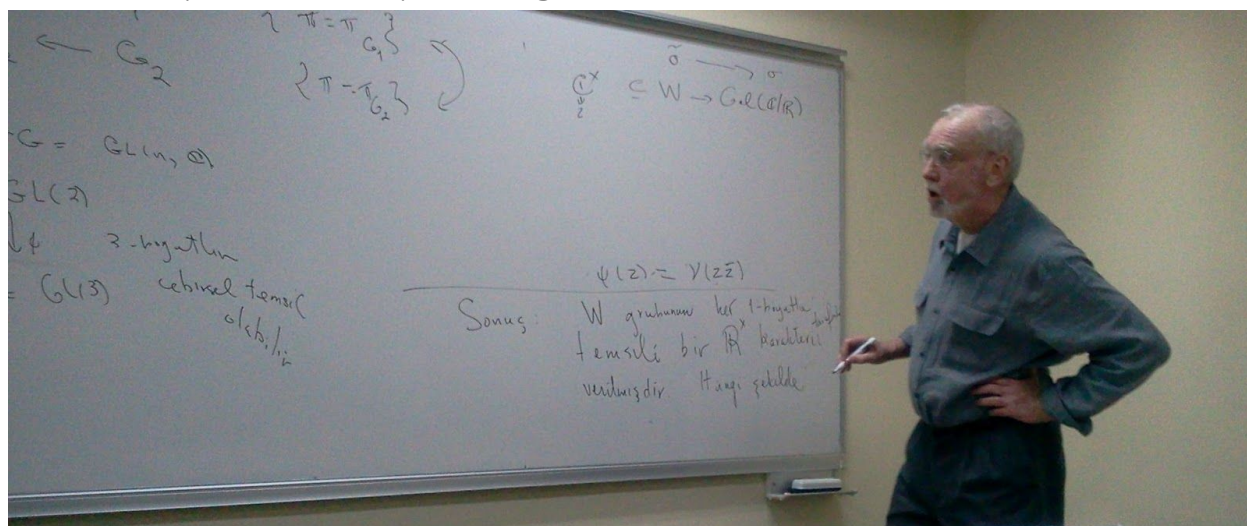
After what I read about Serre I now believe that the problem is not Robert Langlands or Langlands Program, but IAS and Einstein's Office.. I think James Arthur and Edward Frenkel are the the ones who appreciate and value LP the most and the best. Our turkish representative of LP is o.c. **İ. İkeda**. İlhan has been heavily working on **Langlands functoriality**. I am keeping my fingers crossed..

Edward Frenkel wrote an excellent book on LP: "**Love and Math**", whose turkish translation I was proud to be involved in.

James Arthur gave an excellent invited speech at ICM 2014 in Seoul on LP, whose pictures I shared with Bob simultaneously, (thanks to internet). I cannot find those pictures of Arthur in my archive, I just hope Bob saved them..

At Seoul we also met **_Maryam Mirzakhani_**. It was a sad moment. I asked her to have a picture with the turkish group, her neighbour. She said she was too tired, perhaps another time. We heard that she was ill (but not aware of the cause), we were waiting for the historical moment but she could not deliver her Fields Speech.. How sad it was. I am now glad we do not have a picture with her, instead we grabbed **_Manjul Bhargava_**:

I was saddened to read that Bob does not feel fit any more to travel the world.

Long live Bob!
at least 20 more years...

Sen çok yaşa Bob!
en azından 20 sene daha...

y.a.
http://projects.thestar.com/math-the-canadian-who-reinvented-mathematics/